

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	· FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/647,955	08/26/2003	Tricia Susan Reighard	IP-023694	3725
1726	7590 12/04/2006		EXAMINER	
INTERNATIONAL PAPER COMPANY			PATTERSON, MARC A	
6285 TRI-RIDGE BOULEVARD LOVELAND, OH 45140			ART UNIT	PAPER NUMBER
	,		1772	

DATE MAILED: 12/04/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)				
	10/647,955	REIGHARD ET AL.				
Office Action Summary	Examiner	Art Unit				
	Marc A. Patterson	1772				
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 16(a). In no event, however, may a reply be tim ill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	N. nely filed the mailing date of this communication. D. (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 18 Oc	ctober 2006					
	action is non-final.					
3) Since this application is in condition for allower		secution as to the merits is				
closed in accordance with the practice under E	•					
Disposition of Claims						
4)⊠ Claim(s) <u>29-50</u> is/are pending in the application.						
	4a) Of the above claim(s) is/are withdrawn from consideration.					
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>29-50</u> is/are rejected.	· · · 					
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/or	election requirement.					
Application Papers						
9) The specification is objected to by the Examiner.						
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
Replacement drawing sheet(s) including the correcti	• • •	• •				
11) The oath or declaration is objected to by the Ex		• •				
Priority under 35 U.S.C. § 119						
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a) ☐ All b) ☐ Some * c) ☐ None of:						
1. ☐ Certified copies of the priority documents						
2. Certified copies of the priority documents	• •					
3. Copies of the certified copies of the prior	•	ed in this National Stage				
application from the International Bureau * See the attached detailed Office action for a list of	• • • • • • • • • • • • • • • • • • • •	.al				
See the attached detailed Office action for a list of	or the certified copies not receive	u.				
Attachment(s)						
) Motice of References Cited (PTO-892) 4) Interview Summary (PTO-413) Paper No(s)/Mail Date						
3) Information Disclosure Statement(s) (PTO/SB/08)	5) 🔲 Notice of Informal P					
Paper No(s)/Mail Date	6)					

Art Unit: 1772

DETAILED ACTION

WITHDRAWN REJECTIONS

1. The 35 U.S.C. 103(a) rejection of Claims 29 – 48 as being unpatentable over Gibbons et al (U.S. Patent No. 4,888,222), of record on page 2 of the previous Action, is withdrawn.

NEW REJECTIONS

Claim Rejections - 35 USC § 103

- 2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 3. Claims 29 50 are rejected under 35 U.S.C. 103(a) as being unpatentable over Gibbons et al (U.S. Patent No. 4,888,222) in view of Hartman (U.S. Patent No. 5,180,802).

With regard to Claims 29 - 31, 33, and 36, Gibbons et al disclose a barrier laminate (oxygen impermeable laminate; column 4, lines 57 - 61) comprising a paperboard substrate (therefore having a first surface and second surface; column 4, lines 57 - 68), layer of polyolefin applied directly onto the second surface of the paperboard substrate (low density polyethylene; column 4, lines 67 - 68; column 5, lines 1 - 9; Figure 1), a first layer of polyamide, which is an abuse resistant polymer, applied directly onto the first surface of the paperboard substrate (abuse resistant polymer comprising nylon; column 5, lines 2 - 9; Figure 1), a first oxygen barrier layer of ethylene vinyl alcohol applied directly onto the first polyamide layer (column 5, lines 9 - 10, column 7, lines 49 - 57; Figure 1), a caulk layer applied directly on the barrier layer (column 5,

lines 12 - 16; Figure 1) and a polyolefin layer applied onto the caulk layer as the innermost and product contact layer (lastly coated thereon therefore in contact with any product contained by the laminate, a layer of low density polyethylene; column 5, lines 15 - 19). Gibbons et al fail to disclose a polyamide consisting of a polyamide.

Hartman et al teach a caulk comprising a polyamide in the making of a container (package; column 5, lines 16-21) for the purpose of obtaining a container having stability (column 5, lines 16-21). One of ordinary skill in the art would therefore have recognized the advantage of providing for the polyamide of Hartman et al in Gibbons et al, which comprises caulk, depending on the desired stability of the end product.

It therefore would have been obvious for one of ordinary skill in the art at the time Applicant's invention was made to have provided for a caulk comprising a polyamide in Gibbons et al in order to obtain a container having stability as taught by Hartman et al; Hartman et al do not teach a component of the caulk other than polyamide, therefore the layer would consist of a polyamide.

Gibbons et al also fail to disclose a second layer of polyamide, a first tie layer, a second oxygen barrier layer and a second tie layer comprising ethylene vinyl alcohol between the oxygen barrier layer and caulk layer. However, Gibbons et al disclose additional layers of abuse resistant polymer, tie layer and oxygen barrier material (column 8, lines 34 - 38) and teach the selection of the number of additional layers and the ordering of the additional layers depending on the desired specifications of the end product (column 8, lines 36 - 38). Therefore, one of ordinary skill in the art would have recognized the utility of varying the number of additional layers and the ordering of the additional layers to obtain the desired specifications. Therefore, the

Art Unit: 1772

specifications would be readily determined by through routine optimization of the number of additional layers and the ordering of the additional layers by one having ordinary skill in the art depending on the desired use of the end product as taught by Gibbons et al.

It therefore would be obvious for one of ordinary skill in the art to vary the number of additional layers and the ordering of the additional layers in order to obtain the desired specifications, since the specifications would be readily determined through routine optimization by one having ordinary skill in the art depending on the desired end result as shown by Gibbons et al.

With regard to Claim 32, the first and second polyamide layers comprise nylon 6 (column 5, line 6).

With regard to Claim 34, the tie layers comprise an ethylene copolymer with a grafted functional group (column 8, lines 24 - 30); the claimed aspect of the tie layers being an ethylene based copolymer modified with maleic anhydride functional groups therefore reads on Gibbons et al.

With regard to Claim 35, as stated above, Gibbons et al disclose additional layers of abuse resistant polymer, tie layer and oxygen barrier material, and therefore also discloses an additional oxygen barrier layer comprising ethylene vinyl alcohol, which is a polyolefin, and an additional tie layer.

With regard to Claims 37 - 48, Gibbons et al disclose a container for liquid food (carton; column 1, lines 41 - 46), therefore including citrus juice, therefore a perishable product, that is sealed (column 1, lines 53 - 56), and the laminate therefore comprises a blank. The claimed aspects of the container being hot filled, to kill microorganisms, and cooling the product, and

Application/Control Number: 10/647,955 Page 5

Art Unit: 1772

cold filled, and stored at room temperature are given little patentable weight, as the limitations are directed to intended uses of the laminate, rather than structural limitations.

ANSWERS TO APPLICANT'S ARGUMENTS

- 4. Applicant's arguments and amendments regarding the 35 U.S.C. 103(a) rejection of Claims 29 48 as being unpatentable over Gibbons et al (U.S. Patent No. 4,888,222), of record in the previous Action, have been considered and have been found to be persuasive. The rejection is therefore withdrawn. The new rejections above are directed to amended Claims 29 50.
- 5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marc A Patterson whose telephone number is 571-272-1497. The examiner can normally be reached on Mon Fri 8:30 AM 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Pyon can be reached on 571-272-1498. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Application/Control Number: 10/647,955 Page 6

Art Unit: 1772

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Marc A. Patterson, PhD.
Primary Examiner
Art Unit 1772